

State of New Jersey

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September 1, 2011

Thomas E. Pank 1302 Rising Ridge Road Mount Airy, MD 21771

Re: MTD Laboratory Test Certification for the BaySeparator by Baysaver Technologies, Inc.

Effective Date: September 1, 2011 Expiration Date: September 1, 2013

TSS Removal Rate: 50%

Dear Mr. Pank:

The Stormwater Management Rules at N.J.A.C. 7:8 allow the use of manufactured treatment devices (MTDs) for compliance with the design and performance standards provided that the pollutant removal rates have been verified by New Jersey Corporation for Advanced Technology, NJCAT, and certified by the New Jersey Department of Environmental Protection (NJDEP).

The certification process was revised through the "Transition for Manufactured Treatment Devices," dated July 15, 2011. NJDEP has determined that BaySeparator by Baysaver Technologies, Inc. is consistent with the criteria under A. Manufactured Treatment Devices with Interim Certifications. Therefore, NJDEP certifies the use of the BaySeparator by Baysaver Technologies, Inc. with a 50% TSS removal rate, provided that the project design is consistent with the following conditions:

- 1. The model selected for the project design must be sized in accordance with Table 1 and based on the peak flow of the New Jersey Water Quality Design Storm as specified in N.J.A.C. 7:8-5.
- 2. The BaySeparator can only be used off-line. Any flow above the New Jersey Water Quality Design Storm must utilize an external bypass around the system.

- 3. A hydrodynamic separator, such as the BaySeparator, cannot be used in series with another hydrodynamic separator to achieve an enhanced removal rate for total suspended solids (TSS) removal under N.J.A.C. 7:8-5.5.
- 4. The maintenance plan for the sites using this device shall incorporate at a minimum, the maintenance requirements for the BaySeparator, attached.

Table 1

BaySaver Model	Peak Flow for WQ Storm in cfs	BaySaver Manhole Depth in feet	Manhole Diameter in inches	BaySeparator Unit diameter (feet)	T-Pipe Invert Above Floor in feet ("A" in Figure 1)	Connector Pipe Invert Above Floor in feet ("B" in Figure 1)
½ K	0.8	6	48	2	3	3
1 K	1.1	8	48	2	4	4
3 K	1.7	8	60	3	4	4
3 K	2.5	8	72	3	4	4
3 K	3.3	8	84	3	4	4
5 K	3.4	8	84	4	4	4
5 K	4.4	8	96	4	4	4
5 K	5.6	8	108	4	4	4
5 K	6.8	8	120	4	4	4
10 K	6.9	8	120	5	4	4
10 K	9.9	8	144	5	4	4

In addition to the attached, any project with a Stormwater BMP subject to the Stormwater Management Rules, N.J.A.C. 7:8, must include a detailed maintenance plan. The detailed maintenance plan must include all of the items identified in Stormwater Management Rules, N.J.A.C. 7:8-5.8. Such items include, but are not limited to, the list of inspection and maintenance equipment and tools, specific corrective and preventative maintenance tasks, indication of problems in the system, and training of maintenance personnel. Additional information can be found in Chapter 8: Maintenance of the New Jersey Stormwater Best Management Manual.

NJDEP anticipates proposing further adjustments to this process through the readoption of the Stormwater Management Rules. Additional information regarding the implementation of the Stormwater Management Rules N.J.A.C. 7:8 are available at www.njstormwater.org. If you have any questions regarding the above information, please contact Ms. Sandra Blick of my office at (609) 633-7021.

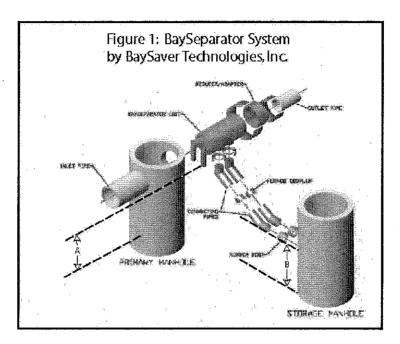
Sincerely,

Ed Frankel, P.P., Acting Bureau Chief Bureau of Nonpoint Pollution Control

C: Richard S. Magee, NJCAT Chron file

Appendix A: Maintenance Requirements for BaySeparator by BaySaver Technologies, Inc.

Effective performance of stormwater management best management practices requires regular and proper maintenance. Chapter 8 of the New Jersey Stormwater Best Management Practices Manual and N.J.A.C. 7:8-5.8 of the Stormwater Management rules provides additional information and requirements for preparing a maintenance plan for stormwater management facilities. Specific maintenance requirements for the BaySeparator manufactured treatment device by BaySaver Technologies are presented below. These requirements must be included in the stormwater management system's maintenance plan in order to achieve the TSS removal rate associated with this manufactured treatment device.



A. General Maintenance

Any and all stormwater management system components expected to receive and/or trap debris and sediment must be inspected for clogging and excessive debris, sediment, and oil accumulation at least four times annually as well as after every storm exceeding 1 inch of rainfall. Such components may include bottoms, trash racks, low flow channels, outlet structures, riprap or gabion aprons, and cleanouts. Disposal of debris, trash, sediment, and other waste material should be done at suitable disposal/recycling sites and in compliance with all applicable local, state, and federal waste regulations.

All maintenance plans must indicate the depth at which sediment must be removed for each MTD specified based on the model designation. At a minimum, removal of sediment, trash and/or oil must take place at or before half the available storage depth below each outlet pipe (shown as A and B of Figure 1 above) is lost for either manhole. For example, in model ½ K, A & B are both at three (3) feet; therefore, sediment, trash, and/or oil must be removed at or before it reaches 1.5 feet in either manhole.

B. Equipment and Training Requirements

Inspection and removal of oil, trash and debris can be performed from the surface through 30-in manhole covers associated with the primary and storage manholes. Equipment to be used for the removal of sediment must be specified by the design engineer in the maintenance plan. For components where direct visual access is not possible, the maintenance plan must specify the equipment, procedures and training necessary to inspect parts in such areas.

C. Structural Components

All structural components must be inspected for cracking, subsidence, spalling, erosion, and deterioration at least annually.

D. Replacement Parts

Certain components of this device are only available through the manufacturer in order to achieve the TSS removal certified by the Department. The following components of the BaySeparator System must be purchased from BaySaver Technologies: BaySeparator unit, reducer adapters and connecting pipes.